

Title (en)

Use of homo- or co-polymers based on quaternised 1-vinyl imidazoles as organic polyelectrolyte

Title (de)

Verwendung von Homo- oder Copolymerisaten auf Basis von quaternisierten 1-Vinylimidazolen als organische Polyelektrolyte

Title (fr)

Usage de homo- ou copolymères à base de 1-vinylimidazoles quaternisé comme polyélectrolytes organiques

Publication

EP 0544158 B1 19961002 (DE)

Application

EP 92119414 A 19921113

Priority

DE 4138763 A 19911126

Abstract (en)

[origin: EP0544158A1] The use of homopolymers or copolymers based on quaternised 1-vinylimidazoles built up from A) from 10 to 100 % by weight of a 1-vinylimidazole of the formula I <IMAGE> in which R<1> to R<3> are hydrogen or C1- to C4-alkyl, and B) from 0 to 90 % by weight of further copolymerisable monomers, in each case based on the sum of A in quaternised form and B), as organic polyelectrolytes in cosmetic preparations, in agents for increasing the conductivity, in flocculants and in auxiliaries in oil recovery, where the homopolymers or copolymers employed are prepared using, as quaternising agents, compounds of the formula II (R<4>) nA II in which R<4> is C1- to C20-alkyl or benzyl A is iodide, carbonate, methylsulphate, ethylsulphate or sulphate, and n is the number 1 or 2.

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IPC 8 full level

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Cited by

EP0715843A1; CN103068248A; US5869032A; CN104684624A; US2015166377A1; EA026987B1; AU2013296610B2; KR20200110332A; EP3744794A4; US11572479B2; US9089128B2; US12049594B2; WO2012017006A3; WO2014022372A1; US6814318B2; US9943782B2; US6682725B1; US9758397B2; US6531142B1; US6514504B1; US6318647B1; US11873454B2; US7152817B2; US6682004B2; US6311903B1; US7078046B1; US6558682B2

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